



June 13, 2021

Vanessa Countryman  
Secretary  
Securities and Exchange Commission  
100 F Street NE  
Washington, DC 20549-0609

Re: Request for Comment on Climate Risk Disclosures

Dear Secretary Countryman,

The Biotechnology Innovation Organization (BIO) appreciates the opportunity to provide comments to the Securities and Exchange Commission's (SEC or the Commission) request for information on climate risk disclosures.

BIO is the world's largest life sciences trade association representing nearly 1,000 biotechnology companies, academic institutions, state biotechnology centers and related organizations across the United States and in more than 30 other nations. BIO members are involved in the research and development of innovative biotechnology products that will help to solve some of society's most pressing challenges, such as managing the environmental and health risks of climate change, sustainably growing nutritious food, improving animal health & welfare, enabling manufacturing processes that reduce waste & minimize water use, and advancing the health and well-being of our families.

### ***Biotechnology and Climate Change***

BIO believes that the scientific bases of climate risks are real and growing. It is incumbent upon all to help bend the arc of this dangerous trajectory.

Climate change is one of the greatest public policy challenges facing this generation. It is increasingly clear that the historical, fossil fuel-based models of carbon, energy and material cycling through the economy are incompatible with maintaining a hospitable environment. Humanity will need to bring every tool it has to bear on this critical challenge.<sup>1</sup>

The biotechnology industry has served and will continue to play a critical role in addressing many of these issues, as our industry is actively creating the science-based solutions to help in both the transition away from the carbon economy and in creating a vision for the future of society's relationship with our environment.

From enhanced carbon sequestration, avoided emissions, and the development of lower carbon products to producing sustainable feedstock and next generation industrial inputs based on synthetic biology, the biotechnology industry is hard at work leveraging biology to develop revolutionary technologies.

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<sup>1</sup> [Biotech Solutions for Climate Report](#)



Advances in bio-based manufacturing and renewable chemical development will be critical in achieving resiliency and greening our supply chains. Using renewable feedstocks such as plants, industrial and food waste, and agricultural residues, we can create renewable chemicals and bio-based products and processes that can revitalize domestic manufacturing and address the increasing rise in emissions in the petrochemical industry.<sup>2</sup>

For example, renewable chemicals and biobased products removed 12.7 million metric tons of CO<sub>2</sub> from the manufacturing sector in 2016 alone, and can continue to green our supply chains, reduce plastic pollution, and provide sustainable alternatives to fossil-based products.<sup>3</sup>

Regulation is a critical tool in compelling industry and market players to price these risks and allocate capital to solutions accordingly. However, BIO believes that regulation should ensure that our innovation ecosystems are not stifled by regulatory regimes that are either overly prescriptive or do not fully balance the needs of investors with the capabilities of companies at various stages of maturity.

R&D-intensive companies are among the most judicious in their use of capital because they are famously capital constrained for a large part of their operating life as product development lifecycles extend beyond a decade. These companies should be allowed to prioritize advancing critical research instead of filing paperwork. These companies should be allowed to use reliable supply chains that meet quality and cost efficiency criteria while developing their first product.

In short, we must ensure that regulation is formulated on the basis of the evolving science (and therefore regulation itself must be adaptive), predicated on sector-specific needs, written and implemented in a transparent manner that follows the Commission's established guidelines, and must scale with the capabilities and revenues of reporting companies.

BIO has established a Sustainability Working Group and polled BIO members to provide data-driven answers and context to the questions posited by the Commission.

These data come from a small, representative sample of BIO members ranging from agriculture and industrial biotechnology companies to cosmetic and therapeutic companies, from enterprises both large and small, and from companies both public and private.

As the Commission determines what actions to take related to climate risk disclosures, we hope that the answers and perspectives outlined below and drawn from the very innovators that will help us overcome the challenges of climate risk, are taken into consideration and help to formulate the foundation of the SEC's climate risk disclosure rules.

BIO welcomes the opportunity to discuss these issues with SEC Staff and stands ready to remain a resource for the Commission throughout this process.

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<sup>2</sup> Spurring a Bio-Revolution in 2021 and Beyond

<sup>3</sup> <https://www.biopREFERRED.gov/BPResources/files/BiobasedProductsEconomicAnalysis2018.pdf>

## **Responses to Request for Information**

In this section, BIO addresses as many of the Commission's specific questions as possible using internal survey results and the framework of principals that govern our approach to sustainability. Note that not all questions are answered.

- 1. How can the Commission best regulate, monitor, review, and guide climate change disclosures in order to provide more consistent, comparable, and reliable information for investors while also providing greater clarity to registrants as to what is expected of them? Where and how should such disclosures be provided? Should any such disclosures be included in annual reports, other periodic filings, or otherwise be furnished?*

BIO contends that whatever standard the Commission ultimately implements should be predicated on (1) what is material to investors in the specific industry, (2) is protected under safe harbors, (3) is flexible and adaptable as science evolves, and (4) is formulated for each industry instead of a one-size-fits-all mandate.

Of BIO members polled **70% have reported** or plan to report on sustainability and/or ESG-related issues **due to internally generated mandates** as either management teams or Boards wanted to provide insight and transparency to investors. This illustrates that issuers are actively adapting to the changing investment landscape, and are successfully furnishing disclosures to investors without a regulatory mandate and knowing that these disclosures may not represent data that are material to investors. Indeed, **80%** acknowledged that current sustainability/ESG reporting items **disclosed do not represent risks** to their businesses.

This naturally begs the question that if something does not constitute a risk to a business model or business operations, and therefore is not a threat to profitability or viability, is it material for investment decisions?

However, **60% of respondents agree that companies should disclose** information or data that tracks how companies are incorporating ESG and/or climate risk-conscious business practices.

It should be noted that the majority of respondents chose a combination of existing frameworks, e.g. SASB and GRI, to fill gaps in each benchmark. Hence, the SEC can help bring standardization and clarity to both investors and issuers on what information or data should be disclosed and how.

As these efforts are long-term, they should be **furnished annually** and should include the ability of management to discuss plans, accomplishments, challenges, and opportunities in a holistic matter so that investors can understand the full scope of work, which includes the benefits and the risks of sustainability programs and business operations.

Finally, a full **100% of respondents agree** that whatever mandate or framework that is developed is based on **sector specific disclosures**. The world is a lot more nuanced and specialized today than ever before, and regulation should adapt to this new landscape.

*2. What information related to climate risks can be quantified and measured? How are markets currently using quantified information? Are there specific metrics on which all registrants should report (such as, for example, scopes 1, 2, and 3 greenhouse gas emissions, and greenhouse gas reduction goals)? What quantified and measured information or metrics should be disclosed because it may be material to an investment or voting decision?*

BIO encourages the Commission to view this question, again, through the scopes of materiality and cost-constraints of smaller companies. Principally, just because something can be measured does not mean that it is material to business operations, business risks, or investment decisions.

According to survey respondents, Scopes 1 and 2 emissions are easiest to disclose followed by CO<sub>2</sub> emissions, water usage and disposal, and aggregate energy use.

Scope 3 emissions, however, are much harder and much more nuanced to accumulate, especially for smaller companies, including Smaller Reporting Companies (SRC) and Emerging Growth Companies (EGC).

There should be robust debate on the ability of smaller companies to accurately report on these emissions as supply chains may be opaque in this regard.

*Should disclosures be tiered or scaled based on the size and/or type of registrant)? If so, how? Should disclosures be phased in over time? If so, how?*

Yes, the SEC should implement a tiered/scaled reporting structure and said disclosure framework should be phased in over time.

Small companies, such as SRCs and EGCs, face significant cost challenges in implementing full Scope 3 reporting. As mentioned in the opening statement, small companies in R&D-intensive industries face cost efficiency versus reporting opportunity costs.

Scope 3 reporting may yield structural changes to current supply chains, benefitting larger players with the ability to include granular reporting requirements. Naturally, these larger players with expanded capabilities tend to be more expensive. More crucially, these critical ecosystem players also tend to be private.

A reporting framework based on quantifiable and verifiable climate risk data is encouraged and needed if the goal of the SEC is to create a market mechanism for pricing of carbon and emissions. However, such frameworks should acknowledge the limitations of smaller companies, as measured by revenues and NOT by market valuation metrics, such as public float. These market-based metrics are capricious and arbitrary, and seldomly reflect company fundamentals over the reporting horizon.

Reporting should be scaled by revenues and catered to specific industries. The SEC should consider phasing in any new rules, to permit companies enough time to gather data, assess risk, and prepare their disclosures.

*How are markets evaluating and pricing externalities of contributions to climate change? Do climate change related impacts affect the cost of capital, and if so, how and in what ways? How have registrants or investors analyzed risks and costs associated with climate change? What are registrants doing internally to evaluate or project climate scenarios, and what information from or about such internal evaluations should be disclosed to investors to inform investment and voting decisions? How does the absence or presence of robust carbon markets impact firms' analysis of the risks and costs associated with climate change?*

BIO member respondents have suggested that the investment landscape for sustainability / ESG cuts both ways when it comes to the cost of capital. As the investment landscape favors those companies with transparency and disclosures, companies benefit from the associated liquidity preferences for those with public securities.

However, as noted above, there are potential consequences for supplier selection and manufacturing planning, which may yield structurally higher operating costs for small, R&D-intensive companies in the therapeutics space.

- 3. What are the advantages and disadvantages of permitting investors, registrants, and other industry participants to develop disclosure standards mutually agreed by them? Should those standards satisfy minimum disclosure requirements established by the Commission? How should such a system work? What minimum disclosure requirements should the Commission establish if it were to allow industry-led disclosure standards? What level of granularity should be used to define industries (e.g., two-digit SIC, four-digit SIC, etc.)?*

The advantages are clear as issuers and investors mutually agree on what data are material for each specific industry group, and what is capable of being reported in each industry group. It is critical that all parties are aligned on these two views of the world as both groups are necessary in addressing the problems of climate change.

The misalignment of expectations often leads to frivolous securities class action lawsuits and structurally high Directors and Officers insurance costs for small biotechnology companies.

As the implementation of sustainability and ESG disclosures will represent a titanic shift in global disclosures, regulators should be cognizant of the unintended consequences and legal costs that may result from these novel disclosures. Companies should not have to face undue liability exposures.

The Commission has the unique ability to align interests and expectations in a manner that enhances transparency and safeguards at the same time, which will assist in price discovery while minimizing frivolous corporate actions.

- 4. What are the advantages and disadvantages of establishing different climate change reporting standards for different industries, such as the financial sector, oil and gas, transportation, etc.? How should any such industry-focused standards be developed and implemented?*
- 5. What are the advantages and disadvantages of rules that incorporate or draw on existing frameworks, such as, for example, those developed by the Task Force on Climate-Related Financial Disclosures (TCFD), the Sustainability Accounting Standards Board (SASB), and the Climate Disclosure Standards Board (CDSB)? Are there any specific frameworks that the Commission should consider? If so, which frameworks and why?*

Sector-specific standards will help to level the playing field among incumbents and will yield a more accurate comparables standard. The majority of BIO respondents used more than one standard in their self-directed reporting as no one standard is capable of accurately capturing the nuances of industry groups while balancing the needs to provide investors with a detailed and holistic view of sustainability-related reporting.

For instance, GRI is considered by many to provide a universal set of disclosures. It is both widely used and well understood. However, the GRI model does not always fit business models and operations, and, hence, not all disclosures outlined within GRI are relevant.



Simultaneously, GRI does not always capture the impact of the spectrum of sustainability measures deployed by companies in certain industries.

Many of the same issues are reflected in SASB standards, with the exception that it is highly specific to each industry. Still, some biotechnology companies lie at the intersection of multiple industry groups, and hence no one standard completely captures the business model nor the intentions of climate-related operations, plans, and disclosures.

Further, what is material to an investor in an integrated energy company may not be material to an investor in early-stage biotechnology companies, and vice versa.

Finally, what is an appropriate amount of energy to use for the creation of a therapeutic? And why should that be compared to the energy it takes to create polyethylene? Both are critical to the functioning of modern society, but these are two distinct products with distinct manufacturing processes.

*13. How should the Commission craft rules that elicit meaningful discussion of the registrant's views on its climate-related risks and opportunities? What are the advantages and disadvantages of requiring disclosed metrics to be accompanied with a sustainability disclosure and analysis section similar to the current Management's Discussion and Analysis of Financial Condition and Results of Operations?*

Above, BIO contended that just because something can be measured does not mean it constitutes material data requiring reporting. Similarly, just because something cannot be measured does not mean it should not be reported.

To account for this, a Sustainability Discussion and Analysis section should be allowed wherein management can explain and describe the nuances of specific industrial processes, business operations, and sustainability programs. The allowance of such a section in annual reports would help provide context and information for investors as both market participants and corporate leaders evolve in a new normal where climate risk disclosures become common place.

### **Conclusion**

BIO believes that we must use every lever available to address the challenge of climate change, and to that end BIO supports the SEC's initiative.

BIO desires that whatever disclosure framework that is ultimately implemented yields impactful results. BIO also desires that this final disclosure framework is rooted in science, has adequate carveouts and scaling considerations for smaller companies, is formulated for each industry group, and is a resilient and adapting framework that is driven by data and investor needs.

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